NATIONAL ENDOWMENT FOR THE Humanities

DIVISION OF **PUBLIC PROGRAMS**

Narrative Section of a Successful Application

The attached document contains the grant narrative and selected portions of a previously funded grant application. It is not intended to serve as a model, but to give you a sense of how a successful application may be crafted. Every successful application is different, and each applicant is urged to prepare a proposal that reflects its unique project and aspirations. Prospective applicants should consult the Research Programs application guidelines at https://www.neh.gov/grants/public/public-humanities-projects for instructions. Applicants are also strongly encouraged to consult with the NEH Division of Research Programs staff well before a grant deadline.

Note: The attachment only contains the grant narrative and selected portions, not the entire funded application. In addition, certain portions may have been redacted to protect the privacy interests of an individual and/or to protect confidential commercial and financial information and/or to protect copyrighted materials.

Project Title: Striking Iron: The Art of African Blacksmiths

Institution: University of California, Los Angeles

Project Director: Marla C. Berns

Grant Program: America's Historical and Cultural Organizations: Planning Grants

Striking Iron: The Art of African Blacksmiths

I. NATURE OF THE REQUEST

The Fowler Museum at UCLA is requesting a $75,000 planning grant from the National Endowment for the Humanities to support the development of *Striking Iron: The Art of African Blacksmiths*, a nationally and internationally traveling exhibition and accompanying scholarly publication. *Striking Iron* will present 250 diverse objects from sub-Saharan Africa and will span early archaeological evidence of ironworking dating from approximately 500 BCE to the present day. Based on decades of research by its curatorial team who has been engaged in this group effort since 2010, *Striking Iron* synthesizes a wealth of humanities and social science scholarship and an extensive inventory of works to create what will be the most comprehensive treatment of the blacksmith's art in sub-Saharan Africa to date. A diversity of public programs including lectures, a family festival, and community collaborations, along with web and K-12 curricular resources will extend *Striking Iron's* reach and enhance the visitor experience. Scheduled to open in Spring 2018 in the Museum's 5,700-square-foot Getty Gallery, the exhibition will remain on view until Summer 2018 after which it will travel to three or more host venues. Letters of interest have been received from the Smithsonian Institution's National Museum of African Art, Seattle Art Museum, Chazen Museum of Art at the University of Wisconsin-Madison, New Orleans Museum of Art, and Birmingham Museum of Art (see Attachment 4). The exhibition will complete its tour at the musée du quai Branly in Paris. Based on exhibitions of similar size and scope, we anticipate that approximately one-half million people worldwide will visit *Striking Iron*.

With its 35-year history of organizing large-scale traveling exhibitions, the Fowler is well positioned to undertake a multi-disciplinary project of this depth and breadth. The curatorial team is headed by MacArthur Fellow and acclaimed Santa Fe-based artist and master blacksmith **Tom Joyce**, who lends his technical expertise and nearly three decades of substantive research and study of African ironwork to this project. Working closely with him is a team of co-curators/scholars: **Allen F. Roberts**, UCLA Professor of World Arts and Cultures, a senior scholar of Francophone African art and cultural anthropology whose work includes the ethnographies of ironworking in Bénin, Chad, Congo/Kinshasa, and Mali; **Henry John Drewal**, Evjue-Bascom Professor of Art History and Afro-American Studies at the University of Wisconsin-Madison, a foremost expert on the arts of the Yoruba peoples of West Africa and their diasporas, and specifically their history of producing ritual iron works; and **William J. Dewey**, Associate Professor of African Art History at Pennsylvania State University, a scholar whose research bridges archaeology and art history, and who has conducted decades of collections research and multi-sited field research on iron in Eastern and Southern Africa. Each team member brings to the project a specialized knowledge of and a distinctive perspective on African ironworking, and all four have a strong record of publication on the subject. During the planning process, an international team of seven advising scholars will further strengthen the exhibition's conceptual development, object choices, organization, and articulation of its humanities themes, and will consult on public programming and outreach. Each will also be asked to contribute one or more essays to the companion scholarly publication.

Striking Iron: The Art of African Blacksmiths will offer visitors an illuminating introduction to the history of iron technology in sub-Saharan Africa and to the ways smiths have transformed one of Earth's most basic natural resources into a medium of life-changing utility, prestige, ritual potency, and artistic expressiveness. Despite the breadth of the exhibition's geographic range, *Striking Iron* does not seek to be a comprehensive survey either over time or space. Instead, it draws on interdisciplinary field research conducted among culture groups living across the continent to offer a thematic approach to the subject. The exhibition draws deeply from a range of humanities and social science fields (e.g., art history, archaeology, anthropology, ethnomusicology, performance studies) to propose a seven-part progression of objects and ideas. Through the project, we seek to demonstrate how iron and the blacksmiths tasked with its transformation have forever changed human civilization in Africa for at least 2,500 years.

Striking Iron will examine how the smith's craft extends from the production of the most basic of domestic tools to the creation of a corpus of inventive, diverse, and technically sophisticated vehicles of social and spiritual power. Conveying how iron objects move from the practical to the symbolic and the cosmological is a key goal of this project. The works selected for the exhibition will date mostly from the early 19th to the late

20th century, many documented in the field and others coming from American and European public and private collections, including early European colonial collections. Interpretive texts and object labels will help articulate thematic concepts, maps will situate the visitor geographically, and field photographs, short video segments, soundscapes, and audio listening stations will enliven the installation and bring the sounds of the forge and the voices of blacksmiths, especially those working today, to the forefront of the exhibition experience.

This is the first funding request to the NEH for support of this project. Considerable national and international research and travel for the project has already taken place, as described in Section IV. *Project History*. An NEH planning grant would make possible the following critical next steps in the project's planning and development between October 2015 and July 2016:

1. The Fowler will convene a five-day planning meeting in early March involving the curatorial team and advising scholars. During the first two days the curatorial team will work intensively on all elements of the exhibition, including its themes, organizational flow, object loan list, and interpretive components as well as on the outline detailing the chapters of the publication. This meeting will refine what has been developed to date and offers a chance to reach consensus before presenting the project to advising scholars/consultants. During days three and four, the advising scholars will join the curators and be invited to respond to the exhibition proposal, publication plan, and programming ideas. This will enable Fowler staff and the curators to solicit critical feedback that will inform the final shape of the exhibition and its companion publication for the implementation phase. A fifth day of meetings with the curatorial team will provide an opportunity to consider and integrate the substance of the consultants' input and provide time to work further with Fowler staff on the exhibition design, media components, and publication. Team members will also meet with filmmaker Peter Kirby, who will be producing the exhibition's introductory video, and with the education team to discuss ideas for programming and public outreach.
2. The Fowler will contract with independent evaluator Emi Yoshimura to provide front-end evaluative tools and convene focus groups to ensure that the exhibition's interpretive strategies communicate successfully to the Fowler's diverse audiences. This evaluation process will be led by Yoshimura and implemented by the Fowler's education department, headed by Betsy Quick.
3. The Fowler will invite Lyn Avins, curriculum consultant, to attend the planning meetings and begin drafting a plan for K-12 curricular resources. She will develop key interdisciplinary lessons to be tested by teachers with whom the Fowler regularly partners.

II. HUMANITIES CONTENT

Introduction to the Subject*: Striking Iron* will explore the myriad ways iron ores—found in the soil, rock and sediment that form much of the earth's surface—were smelted and forged by African ironworkers to shape cultures and communities in the most fundamental ways. The Iron Age revolutionized Africa and forever altered human civilization practically, symbolically and cosmologically. Iron tools, weapons, currencies, musical instruments, accouterments, and other important objects enabled Africans to forage and hunt, till the soil, and assure their own protection and prosperity. Technologies of iron smelting and forging were greedily sought and jealously guarded, for their control could promote a king's ambition, enhance a soldier's fortune, and secure a community's well-being. Nowhere else in the world is there a more diverse and sophisticated corpus of forged iron utilitarian forms and artistic expressions than in Africa. The blacksmith's work and participation in community life continues to be indispensable today.

Iron's Origins: World history has often been categorized as a progression from the Stone Age (ca 10,000–3,000 BCE) to the Bronze Age (ca 3,000–1,000 BCE) to the Iron Age (ca 1,000 BCE–present), but in sub-Saharan Africa the Stone Age evolved directly into the Iron Age, dated to have begun around 500 BCE based on archaeological evidence from sites such as those in Northern Nigeria associated with the ancient Nok culture. Iron is one of the continent's most plentiful natural resources, and yet one of the most difficult to process into usable raw material. The origins of smelting and forging technologies in Africa are fervently

debated by archaeologists: Were they invented and developed independently in several sub-Saharan locales? Were they disseminated across the deserts from the north of Africa, the Sinai Peninsula, and India, or inland from Indian Ocean coasts? Or, most probably, were they derived from both? However they came to be known to African artisans, iron technologies were quickly adopted, adapted, and perfected to exploit the potentiality of local resources and meet the needs of communities.

Introduction to Iron smelting: Before iron can be worked into useful products, it must first be extracted from iron-rich deposits through a refining process known as *smelting.* Its purpose is to remove impurities from a geologic matrix (iron ore) using intense heat (2100° - 2300° Fahrenheit) to melt away mineral contaminants, while simultaneously freeing iron particles bound in the rock, allowing them to gather together, without melting, to form a sponge-like malleable mass called a *bloom.* Expert blacksmiths specializing in this process developed very efficient techniques to reach the staggeringly high temperatures necessary to maintain a near-molten condition long enough to ensure the delivery of clean, consistent, high-quality blooms. To achieve this, smiths devised ingenious furnace designs and methods to feed air into their fiery chambers. Sometimes they were fed by natural-draft, with earthen furnaces constructed to create a chimney effect that channeled a rush of air from bottom to top to intensify interior temperatures. Other delivery systems required bellows fashioned from leather, clay, or wood designed to preheat air while hand pumping a strong blast into terracotta tubes inserted into the furnace openings. Once smelting was complete, the bloom settled to the bottom of the furnace and was removed for further refinement through repeated heating and hammering into bars that were relatively easy to store and distribute. These bars were of a quality ready to forge directly into useful objects.

A medium rich with possibility, the smelting of iron has been likened by its producers to the act of procreation. In the late 19th century, European travelers first began recording detailed descriptions of furnaces taking anthropomorphic form. The Chokwe peoples of Angola, for example, built furnaces of clay in the shape of female torsos, sometimes complete with breasts, womb, and birth canal (Fig. 1). Similarly, bellows were frequently carved in wood or modeled in clay to suggest phallic or male attributes, and when used were inserted into the furnace openings in a manner further accentuating the sexual metaphor. Some bellows, such as the one illustrated below (Fig. 2, displayed upright here), were carved in figurative forms to represent ancestral personages and would have been positioned horizontally, with animal skin or vegetal fiber covering the two hollow bowl shapes through which air is pumped by hand. Fertility medicines were sometimes placed beneath or upon the floor of the furnace before being lit, and a master smelter would invoke the successful "birth" of bloomery iron by performing prescribed dances, songs, and incantations intended to assist and encourage the laborious process ahead.

Fig. 1

Fig. 2

Fig. 3

Introduction to Iron Forging: Forging is a manufacturing process exercised to manipulate iron and other metals into a variety of forms. When iron is heated to white-hot temperatures, it can be shaped with the

compressive force of hammer blows as if it were hard clay into any desired shape in the hands of a skilled practitioner. One of the oldest known metalworking processes, forging was accomplished by smiths using personalized hammers, anvils, tongs and other implements made by the smith himself to create tools, weapons, household necessities, jewelry and ritual objects of symbolic and often poignant significance. A state of the art technology still in practice across the continent (Fig. 3), the forge itself and the tools and methodology employed by the blacksmith show enormous diversity from region to region. Among the products made by precolonial African smiths were distinctively designed and highly regular iron shapes that served as currency for exchange or barter within particular communities and localities. Once ubiquitous throughout much of the continent, the exhibition will feature trade tokens from Sierra Leone, Liberia, Cote d'Ivoire, Cameroon, Burkina Faso and Nigeria in West Africa, and from Tanzania and the Lake Tanganyika area of East Africa, from Chad, Gabon and the Democratic Republic of Congo in Central Africa, as well as Zimbabwe from Southern Africa. Bundles of such tokens could reach quite staggering numbers, from the thousands or tens of thousands, as was documented in precolonial Southern Cameroon or Liberia. As such, iron was equated with value itself.

Indeed, across the continent in the precolonial era iron objects were essential to survival. Both the smelted iron itself and the fundamental utilitarian forms into which it was forged could lend power to ritual and ceremonial activities, especially those involving social and economic transactions and transformations. For example, the worn hoe blades used to cultivate crops in Yoruba communities in Nigeria could be re-forged by smiths into impressive, nearly life-sized ritual staffs used to proclaim the deity *Orisha Oko's* prowess in bringing wealth. Thus, the ultimate purpose of such re-appropriated object types became symbolic rather than utilitarian.

Iron and Change: In the late 15th century Europeans began exploring the West African coast, seeking trade in raw materials. In many instances, tools forged by African smiths from locally smelted iron were absorbed into these early European enterprises. In the 16th century, for example, the Portuguese thought so highly of the quality of the iron produced by the Shona (today, in Zimbabwe and Mozambique) that they took it to India for use in the manufacture of guns. Research by archaeologist and *Striking Iron* advising scholar Candice Goucher suggests that transatlantic slavers specifically hunted down West African blacksmiths to meet the forging needs of maritime commerce and Caribbean plantation economies. Since iron was the trade token of choice, European merchants also began exporting inexpensive iron for local smiths to use, often transported as ballast in the holds of slave ships bound for the shores of Africa. Such scrap soon replaced the arduous work of smelting in African coastal societies, and deepened proto-colonial dependence upon foreign sources of iron. Additionally, replicas of precolonial African iron currency tokens were mass produced in England, France, Portugal and other trade nations of Europe and exported back to Africa to encourage and support political alliances and further destabilize self-sufficient local economies. Such hegemonic, imperialistic strategies led to the obsolescence of local iron-smelting technologies. For most practical purposes, by the 1920s, indigenous furnaces across Africa ceased producing bloomery iron, and iron currency production was eventually outlawed by all colonial regimes in favor of Western monetary equivalents.

Iron Today: Forging continues across sub-Saharan Africa as documented by the research of *Striking Iron* curators and consultants. In response to shifts in local economies during the colonial period, African blacksmiths began incorporating increasingly available salvaged materials into their work through creative recycling. Today, smiths forge work to accommodate new contexts and purposes. The Yoruba deity of iron, *Ogun*, for example, has become the deity of the automobiles, laptops, and cell phones that are ubiquitous in urban Southwestern Nigeria. As will be demonstrated in *Striking Iron*, cultures always keep pace with new needs and opportunities. Blacksmiths continue to help people cope with social and political change, serving as technology brokers who transform one thing into another—e.g., truck wheels become bells and gongs; automobile leaf springs become axes and machetes; old refrigerators become charcoal stoves and *asen* (iron tomb and shrine sculptures) in Bénin; and broken bicycle spokes become "thumb pianos" in Western Zambia. At the same time, smiths continue to forge objects for ritual activation, spiritual empowerment, and ancestral veneration as well as healing, fertility, prophecy, and protection.

III. PROJECT FORMAT AND RESOURCES

The curatorial team has proposed that *Striking Iron* be organized thematically rather than chronologically or geographically to provide audiences with a more layered, comparative view of forms, materials and uses of iron. Given the enormous variety of iron-related objects found across sub-Saharan Africa, and to avoid appearing monolithic, *Striking Iron* will use specialized Case Studies to tell stories about the broader ideas and relationships with iron that have shaped and continue to impact communities across the continent today. As with past NEH-funded Fowler exhibitions of great breadth and geographic reach (e.g., *The Heritage of African Music* [1999], *Art of Rice: Spirit and Sustenance in Asia* [2004]), this project will provide a dynamic experience for visitors and will encourage an exploratory, rather than a linear pathway through the exhibition. The Fowler will utilize a number of interpretive strategies to provide visitors with multiple ways of accessing the content of this project.

a. Interpretive Strategies and Visitor Experience: *Striking Iron* will be mounted in the Fowler's 5,700-square-foot Getty Gallery. This large open space can be divided into a series of intersecting rooms to enhance the flow between each of the thematic sections. The curators have elected to introduce many of the sections with "Focus" moments, featuring one or more objects selected to visualize key concepts and to encourage visitors to pause and contemplate the messages of each section. Specially designed cases and graphics will draw attention to these works. The interpretive strategy also includes Case Studies spotlighting specific ethnic groups whose use of iron in social, cultural, and political contexts is notable. Visitors will learn more about these selected peoples, drawing on field research conducted in West, Central, Eastern and Southern Africa, mainly by this project's curators and consultants. Case Studies also will include field photographs and video footage when available to give visitors a fuller understanding of how iron works in these societies. By doing so, *Striking Iron* not only looks at commonalities across cultures but also underscores cultural specificity, distinction, and difference within the vastness of the African continent. The provisional thematic sections of the exhibition, as outlined by the curatorial team, are as follows:

1. ***INTRODUCTION: IRON ACROSS GEOLOGICAL TIME*** begins with an immersive experience of images and sounds introducing the pervasive presence of iron in our lives, something most Americans might not immediately realize. We have contracted with award-winning filmmaker Peter Kirby to begin the early development stage of a two-minute video loop designed to engage the visitor's curiosity with a sequence of visually compelling images. The video is envisioned to start with sweeping views of galaxies and stars and of the earth's reddish lateritic soil (made so by deposits of iron oxide), and then move to a depiction of iron's presence at the earth's molten core, which creates the dynamic magnetic fields that keep our planet tethered in orbit. Moving from this macro, geological view to a micro view, subsequent images will show iron-rich blood pulsing through veins, sustaining a beating heart and oxygenating the body. The final segment is envisioned to take us to West Africa and enter a forge, with tightly-framed footage of flames stoked by bellows, hammers striking red-hot iron, and bursts of steam as water cools iron. Using footage taken in Togo by lead curator Joyce and ethnomusicologist/advising scholar Steven Feld, visitors will see and hear the rhythmic blows of hammer on anvil and the pumping of air via bellows. The same soundscape will be encountered again as visitors move through the exhibition. The intent of this dramatic introduction is to pique visitor interest in the centrality of iron to the universe and to their own lives, and not just those of Africans.

Exiting this dynamic space, five iron objects—each displayed in its own case—have been proposed to introduce key genres of the blacksmith's craft. Sharing the space are the exhibition's introductory text panels, one presenting the key messages of *Striking Iron* and a second reiterating the main points about the life-giving properties of iron addressed in the opening video sequence. A large-scale satellite map of Africa will situate visitors geographically, showing the continent's sweep of reddish lateritic soil and the enormous quantities of iron found across sub-Saharan Africa. Ethnic groups in the exhibition will be noted on a political map of present-day countries with a satellite map overlay.

Fig. 4

Fig. 5

Fig. 6

The five iron masterworks provisionally chosen to open the exhibition are:

- A striking, six-foot-tall iron blade made by a 19th-century Topoke smith from the Democratic Republic of the Congo (DRC), which illustrates what scholars have learned: that such large and extravagant forms are equated with value, and by virtue of the amount of iron from which they are forged, have become tokens of economic exchange and symbols of political authority (see Attachment 6, Sample Images, p. 10).
- An elaborately rendered double iron blade with a wooden grip from Ekonda peoples of the DRC introduces the point that such virtuosic objects, which may have derived from actual weapons, have become emblems of status and prestige (Fig. 4).
- A Songye sculpture from the DRC illustrates how the addition of iron elements to a carved wooden figure is often a means to activate spiritual forces (Fig. 5). This rare and unusual power figure bristles with metal fragments and miniature tools, is strapped with medicinal bundles, and would have been carried by the two long iron rakes similar to those used to tend the blacksmith's fire. In this sense, its fearsome power was metaphorically too hot to touch and needed an iron intermediary to safely handle its supernatural potential.
- An intricately carved and forged iron spear from Luba peoples of the DRC is among the most important and compelling of a Luba king's insignia. It is a mnemonic device, recalling histories of political power and how Luba kings were "forged" through ritual processes and recognized as semi-divine. The female protective spirit depicted on the shaft reminds us that for Luba, only the bodies of women are powerful enough to hold the secrets and powers of political authority.
- The Ghanaian Asante double gong is usually performed in connection with the drumming associations of warrior groups (Fig. 6). The sounds produced by the iron gongs may also be used to send messages. Research conducted among the Asante has revealed that gongs with such an elaborately carved figurative wood handle were associated with political and religious functions.

2. In ***AFRICA'S IRON ORIGINS,*** visitors will be introduced to a summary of the archaeological evidence used to reconstruct the histories of iron smelting (the transformation of iron ore into a usable form) and of smithing (the forging of iron into useful shapes) in sub-Saharan Africa. Here, didactic text panels will foreground ongoing debates about whether or not these technologies were invented and developed independently in several sub-Saharan locales. Co-curator Dewey and advising scholar Shadreck Chirikure will distill the evidence and select several important archaeological sites as illustration. A map will plot some of

the earliest known sites of ironworking across the continent, such as those found in Western Tanzania, Rwanda, Burundi, Nigerian sites in the Nok and Nsukka area, and Senegal.

Early archaeological examples of forged iron objects are relatively rare in museum collections and research will be conducted during the planning phase to identify objects associated with known sites. For example, at the ancient site of Jenne-Jenno in Mali, a circa-9th century CE smith's atelier was excavated. Inside, a male/female terracotta pair was embedded in the workshop's wall along with broken iron bits and slag. Ceramic sculptures associated with the Jenne culture are among the most enigmatic early figurative sculpture we know from sub-Saharan Africa. Hundreds of illegally excavated terracotta figures have reached the Western art market. The lack of scientific data about their original context has led to much guesswork about their meanings and purposes. A research project investigating this sculptural corpus using medical CT scans led by Dr. Marc Ghysels has discovered that some figures have embedded forged iron objects in the ears, eyes, spine and womb, suggesting iron's likely empowering role (see Attachment 6, Sample Images, p. 3). We will consult further with advisors Chirikure and Scott MacEachern to understand the sensitivities of exhibiting such ceramics or whether photographs and scans should suffice.

Finally, a Case Study on present-day Dogon peoples of Mali can be used to focus attention on the primacy of iron and blacksmiths via stories of origin. One of the Dogon founding ancestral twins was a master smith represented in an array of sculptural and iron forms. Advising scholar Patrick McNaughton will assist with this section, based upon his landmark research and writing about smithing among a number of peoples of Mali.

3. In ***IRON'S MATERIAL TRANSFORMATION,*** the exhibition will use videos and narration, as well as a careful selection of objects, to examine two important thematic ideas: the distinct technological complexities of smelting and forging, and the profound effect blacksmiths continue to have on African societies. The first part of this section will include historical photographs and videos of precolonial African smelting furnaces and a selection of actual iron blooms along with the smith's tools for forging: hammers, anvils, bellows, and tongs. In an adjacent video, blacksmith-curator Joyce will provide first-hand narration to help visitors understand and appreciate the intricacies of forging and the specific work of smiths, as documented in various African communities.

The second part of Section 3 will consider how blacksmiths' near-mystical capacity to transform the earth into objects of utility has lent them and the products of their labor profound symbolic importance. Among Mande-speaking peoples of Mali, for example, blacksmiths must only marry within their own community and their daily activities are surrounded by ritual prohibitions. Yet, they are among the most powerful of persons—both revered and feared—and summoned to craft, perform, and oversee important events of transition and transformation, such as birth, initiation, marriage and death. Even the steam produced by quenching a newly formed red-hot bloom was considered by precolonial Mande-speakers to be the life force of ancestors and was inhaled for its protective benefit. A Case Study on a blacksmith society known as *Komo* among Bamana peoples of Mali will feature a range of ritual objects made of iron and other materials to express the awesome power of Bamana smiths, as revealed in McNaughton's research. Fieldwork by co-curator Roberts among peoples of the Southern DRC and co-curator Dewey among Shona of Zimbabwe and Luba of the DRC will offer additional examples of how, in many African cosmologies, such key technologies were introduced or protected by divine culture heroes.

4. ***FIELD AND HOME: SUSTENANCE FROM THE ANVIL*** turns its attention to the kinds of iron tools that enabled African peoples to survive and thrive, especially via agriculture and hunting. The association of iron with sustenance—from the field or the hearth—lays the groundwork for later sections of the exhibition that emphasize how the fundamental significance of the blacksmith's work lends meaning and power to iron's symbolic role in ritual and spiritual activities as well as in reinforcing social transitions and status. This section is an opportunity to provide visitors with multiple examples of how African smiths have pushed their craft far beyond utility into domains of artistry. First, we will display several examples of the basic tools of agriculture—variably shaped hoe blades used in tilling the soil and planting, and sickles used for harvesting. Exaggerations

of these tool shapes have become dance wands used in initiations into adulthood, as exemplified by several peoples living in Northern Nigeria and studied by Fowler Director and team member Marla Berns (Fig. 7).

Fig. 7

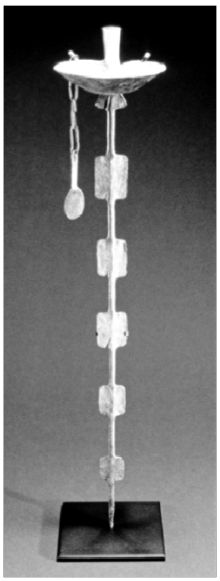

Fig. 8

Fig. 9

Next, the exhibition turns to iron objects associated with the home including ember tongs, oil lamps, and cooking implements, whose elegant forms add beauty to domestic interiors (Fig. 8). Also associated with the household are forged iron currency tokens that serve as a medium of exchange, especially in payment of bridewealth in marriages. Some bridewealth currencies, like the iron coils produced by the Ngongo-Iyem of the DRC, reach extravagant lengths and were displayed to publically show that the groom had fulfilled his obligation to pay the bride's family before she left her natal household to go to her husband's.

Finally, sharp iron blades made it possible to produce the distinctive types of body modification practiced by many precolonial peoples across the continent—as they still are in some places. Permanent scarification marks were cut into the skin with special iron knives and hooks, and delicate blades were used to shave the head and beard, sometimes into elaborate designs. These were part of programs of personal adornment that served as symbols of belonging to a community and of one's status within it. Smiths also produced elegant and imaginative iron bracelets, neck torques, hairpins, pubic aprons, and belt ornaments from places as disparate as the Sudan, Botswana, Nigeria, Cameroon, and the DRC, which further signified social transitions, such as a girl's or boy's initiation to adulthood or a woman's first born child.

5. In the next section, ***IRON'S EMPOWERING ROLES,*** we will explore how the presence of iron has been shown to activate different kinds of power and efficacy in societies across sub-Saharan Africa. Shrines were and sometimes still are studded and graves bedecked; masks are clad and sculptures bristle—all with forged iron elements directing spiritual agency to pressing community needs. Amulets, rainmaking staffs, and figurative sculptures were, and continue to be made of or enhanced with iron. In this section of the exhibition, we envision a series of six prominent Case Studies that draw on the extensive field research done by co-curators Drewal, Roberts, and Dewey. Each will use a combination of carefully selected objects, texts, field photos, and video to explore the specific activating capacities of iron, especially in the ways it embodies the supernatural forces that intervene in people's lives. We expect that each Case Study will have its own space within the gallery. Examples include:

- Among Gan peoples of Burkina Faso, iron staffs, often in the form of snakes, can call down the rains or protect people from lightning (Fig. 9);
- Among Dogon peoples of Mali and Edo peoples of Nigeria, amulets in the form of miniature forging tools are strung on chains to transfer the courage of the smith in handling hot iron to the wearer who seeks assistance in life-sustaining matters;

- Among Yoruba peoples of Nigeria and the Republic of Bénin, blacksmiths fashion ritual objects that serve to make connections with deities, including figurative staffs for *Ogun* (the god of iron central to Yoruba thought and action), pairs of linked figures for *Ogboni* (guardians of the law and ancestral presence on the earth), and staffs with birds for devotees of *Osanyin* (god of medicine); and,
- Among Luba peoples of the DRC and other peoples in Central and Eastern Africa, semi-divine kings were "forged" through ritual processes and were sometimes themselves renowned smelters and smiths, as is said of Karagwe leaders of Northern Tanzania. A range of stunning Luba wooden sculptures are studded with tiny iron anvils to activate and direct the transformative powers of the forge to help solve everyday community and personal problems.

6. ***VIRTUOSITY, VALUE AND STATUS*** begins with a focus on process and technique to help visitors appreciate the accomplishments of African smiths. Working with lead curator Joyce we will select several objects, including the delicate forged human head that crowns the Songye staff shown below (Fig. 10), to explain how smiths used their skills to produce forms that bespeak mastery and ingenuity. Well-forged tools, weapons, accouterments, and other items were sought and proudly displayed, as they sometimes still are today, lending prestige to those who made and/or used them. Especially virtuosic is the throwing knife—an African invention of revered status forged in a spectacular array of forms—found among many peoples living across the center of the continent (Fig. 11). Co-curator Roberts saw them carried by men in Southwestern Chad in the 1960s, for example, and according to one Chadian cosmology, the first throwing knife was offered by the Supreme Being to initiate human culture. Some of the most elaborate examples of blades, axes, and staffs were not intended for use but rather were forged with consummate skill and artistry to aestheticize power. We envision a large display of forged iron blades to illustrate the links among virtuosity, beauty, and efficacy.

Fig. 10

Fig. 11

Fig. 12

Additionally, using video footage, lead curator Joyce will explain the extraordinary technical sophistication of African smiths and we will also edit segments of interviews he conducted with Ewe chief Togbui Kougblenou Raphael Yovo-Agossi I of the town of Yohonou, Togo. Trained as a blacksmith, he was recognized by community elders for his wisdom and mediating skills and was chosen as chief, leaving behind the forge in his family's compound. Another segment presents interview footage with Leon Hounsounougan, a renowned maker of *asen* living in Abomey, Republic of Bénin. Within the high-walled compound adjacent to his forge he speaks of commissions and design processes decided with his clientele, while showing us sketchbooks, notes and prototypes.

As touched upon in Section 4, technical mastery is also linked to notions of value and is evidenced in forged iron currencies once made in many different African societies. These tokens were given eccentric, sometimes astoundingly complex shapes and unwieldy sizes. Iron currency conveyed different values to different peoples, showing that value is neither universal nor enduring, but is contingent upon socio-historical circumstances of

specific communities. The most impressive currency forms, such as 19th-century oversized throwing knife blades made by Ndengese peoples of the DRC (Fig. 12), also recalled occasions when their exchange facilitated key social transitions or the promise of community well-being. In this sense, iron was the blood and vigor of human continuity.

7. SOUNDING FORMS*,* the final section, will return to the sounds associated with the forge—hammering iron and pumping bellows. Here, visitors will examine several types of musical instruments made from iron that are used in important ritual practices such as calling ancestral spirits, clearing village pathways of malevolent forces, accompanying political and religious functions, or activating social transformations in women's and men's initiations. Field photographs will be used as contextualization. Gongs and rattles were and often still are forged of iron. Some are played for entertainment or spirit possession ceremonies, such as lamellophones (popularly known as "thumb pianos")*,* bells, and percussive ratchets. Also included in this section will be footage by ethnomusicologist and *Striking Iron* advising scholar Steven Feld, who, along with lead curator Joyce, has studied the percussive rhythms of an Ewe forge in Yohonou, Togo and the making of a double gong. The sound of the hammer striking iron and the bellows pumping air creates a sonic interaction between blacksmith, Galbert Atakpa, and bellows operator, Hodenou Noglo, during its making. Such gongs are timekeepers and "mark" the beat during numerous forms of dance/drum ensemble music in West Africa. That the sounds of the forging environment manifest a musical harmony, underscores a kind of "acoustemology" of broad human harmonies exercised during key moments of social transition and transformation.

To end the exhibition, the curatorial team has proposed a soundscape and large-scale video projection of contemporary blacksmiths working in the vast public marketplace in Bamako, Mali, reminding audiences of the ongoing vitality of ironworking across sub-Saharan Africa. Moving through this final space, visitors are surrounded by the pounding, clanging, and banging of some 500+ smithing groups, organized by guild according to the metal they work and the objects they specialize in making. Here, Malian blacksmiths incorporate salvaged materials into their work and continue to turn their creative talents to new contexts and purposes.

b. Publication: A lavishly illustrated, multi-author publication will be produced by the Fowler's publication team to complement the exhibition. Co-edited by Joyce and Roberts, the publication will be a comprehensive and enduring compendium of scholarship on the subject. The text will be divided into sections, roughly corresponding to those of the exhibition, with lead chapters written by members of the curatorial team. Shorter essays on specific topics will be written by the project advisors along with contributions from approximately six to eight additional scholars from Africa, Europe and the Americas. Discussions about the book and the authors of specific chapters will occur during the planning meeting scheduled for early 2016. Like many Fowler books, *Striking Iron* will present interdisciplinary perspectives, and will encompass multiple means of access to ideas through "interleaves" (typically 1- to 4-page essays with illustrations), extended captions, interviews, field photographs, and studio photographs of the works chosen for the exhibition. The publication will be edited and designed by Fowler staff and distributed by the University of Washington Press.

c. Website: A special section of the Fowler's website (www.fowler.ucla.edu) will be developed to publicize the exhibition and to expand its reach to both in-gallery and virtual visitors. The site will feature a diversity of voices and interactive multimedia materials, interviews with scholars and blacksmiths, and further resources on 1) the processes of iron production in Africa, 2) the virtuosity of African ironworkers, 3) the cultural role of iron in Africa, and 4) the role of iron in contemporary life. Also presented will be image galleries, texts, additional videos (for example, a documentary about *Ogun*, the Yoruba god of iron), and interactive tools in which the user can play an iron musical instrument or design an iron tool or sculpture. A computer kiosk will be positioned inside the gallery so that visitors can access this information on-site or via their smartphones.

d. Educational Resources: One of the Fowler's major goals is to promote lifelong learning in open and accessible ways, and as such, we plan to utilize a variety of learning strategies and types of programming intended for youth and family, adults, scholarly and lay audiences, along with students, professors and staff on the UCLA campus. We anticipate a diverse schedule of approximately 20 programs to accompany the Los Angeles presentation of *Striking Iron*, including family art-making opportunities, gallery talks, and

roundtable discussions, all offered free of charge, or for a modest materials fee. With the breadth of African cultures included in the exhibition, visitors will have ample opportunity to consider and compare the range of meanings that iron holds. The array of programs will be designed to accommodate visitors' varied styles of learning, levels of knowledge, and degrees of interest. The series will be nuanced by discussions, scholarly discourse, and experiential opportunities. The Fowler team will seek the input of curators and advisors in suggestions for speakers, films, and other outreach programs.

Adult Public Programs: In an opening presentation, lead curator Joyce will discuss African iron through the lens of his extensive experience and expertise as both a participant/observer in Africa and as a working artist/blacksmith. The curatorial team will be a part of a symposium intended to deepen access to the themes and topics of the project. Lectures by scholars and practitioners of several humanities and social science disciplines (e.g., history, archaeology, art history) will offer varied perspectives on the historical, social, and cultural contexts of ironworking across Africa. The Fowler will also host a series of its popular *Culture Fix* noontime gallery talks—informal sessions led by scholars, artists, and curators that help audiences access the material on display.

Community and Campus Curricular Tie-ins: To connect with young adults and those interested in blacksmithing and other metal arts, the Museum recently established a partnership with the non-profit organization Adam's Forge (www.adamsforge.org), a center in Los Angeles for "forging character and forging community through the forging of iron." We will explore the possibility of bringing an African blacksmith to Adam's Forge for a short-term residency and to do demonstrations, while the Forge's student and smithing communities will participate in programs at the Museum. The Fowler and Adam's Forge will work together to create educational materials, work with teachers, and coordinate off-site programs about blacksmithing and thereby enhance their programming with a focus on Africa. As with all of its major exhibitions, the Fowler will work closely with academic departments and interdisciplinary centers across campus to deepen their involvement and participation in the project and its accompanying programs. The Museum is already in conversation with UCLA faculty from World Arts and Cultures/Dance, Art History, Arts and Architecture, the Cotsen Institute of Archaeology, and Design Media Arts.

Public Schools: The Museum will work closely with area schools and educators to develop a programmatic agenda around *Striking Iron*, with a focus on creating lessons that address the Common Core Standards. Iron-centered resources will be developed and lessons provided that focus on science, literature, African history, and the visual and performing arts. Materials will be developed by veteran curriculum writer Lyn Avins, with whom the Museum has worked for many years. As it has done with other NEH-sponsored exhibitions in the past, the Museum is also pursuing a special issue devoted to iron with *Faces,* a magazine for 9-14 year olds that explores global cultures and issues. Professional development offerings will include collaborations with Adam's Forge to offer opportunities for teachers to observe and actually participate in iron working, take part in curatorial discussions, and work together in lesson planning. High schools and community colleges with vocational classes related to metalworking will be a special target of our efforts. We anticipate approximately 7,000 students will be served, many of them from underserved communities.

Families: Throughout the run of the exhibition the Museum's education department plans to offer weekend programs on particular themes of the exhibition. Geared for families with children in the 5-12 year old range, such programs will enable attendees to engage informally in learning experiences. They may discover the exhibition in directed viewing activities, experiment with iron-inspired art and music making, or participate in performance-based stories related to the arts on view. Finally, in collaboration with partner community organizations and UCLA departments, the Fowler will host an all-day *Striking Iron* Family Festival in Spring 2018. This event will feature percussive music and dance performances, storytelling, and art making. Families will have the opportunity to make music in an all-iron orchestra, create sound-producing, iron-inspired dress, and safely experiment with the heft and weight of iron tools. UCLA students will participate as gallery teachers/tour guides and event volunteers. Based on past events of this nature, we anticipate 1,000+ attendees to the Festival.

Audience Goals of the Project
To date we have developed the following goals for the project, which we anticipate will be further refined and expanded during the planning process:

- To examine the essential roles and range of meanings iron holds in African communities. Visitors will be reminded of the ways iron also conveys notions of strength and permanence in Western cultures;
- To learn how communities in Africa regard blacksmiths and the objects they make as capable of harnessing the powers of the natural and spiritual world, effecting change and assisting with life's challenges and transitions. This capacity is tied directly to the smith's mastery of the transformative processes of smelting and forging;
- To dispel misconceptions about what a blacksmith does and to clarify the materials and processes the blacksmith must master to create his works; by extension audiences will better understand the blacksmith's important place in American history;
- To examine the sophistication of the tools and methods employed by African blacksmiths, and to recognize that while these processes are ancient, they are by no means simple or primitive;
- To consider the beauty and mastery of the works on view and to understand that aesthetic excellence is often linked to the cultural roles, purposes and efficacies of iron objects; and,
- To understand that artistic production in Africa is never static but rather is in a constant state of creative renewal in response to change. Visitors will learn that despite the forces of modernity and globalization, contemporary blacksmiths have turned their creative talents to new sources of iron and new purposes for their work.

IV. PROJECT HISTORY: *Relationship to Other Projects on the Topic and the Project's Unique Contributions*
Several smaller exhibitions of African iron arts have been mounted, including *Iron, Master of Them All* (University of Iowa Museum of Art, 1993), by *Striking Iron* team members Dewey and Roberts; *Life Force at the Anvil: The Blacksmith's Art from Africa* (University of North Carolina at Asheville, 1998) by Joyce; and the UNESCO travelling exhibition *The Iron Roads of Africa* (1999). (A comprehensive list of iron-related exhibitions follows the project Bibliography, Attachment 3.) Nevertheless, in-depth studies of iron arts are relatively few given their central importance to African cultural histories, and there has been very little interdisciplinary discussion of the aesthetics, ideologies, and symbolism of iron smelting, forging, trade, and use. *Striking Iron* seeks to further scholarship in these areas and promises to be the most comprehensive treatment of African iron arts to date.

Striking Iron is particularly strengthened by lead curator Joyce's three decades of intensive study of the literature on African ironwork, his knowledge of collections, and his ongoing field research with African blacksmiths since 2008. Awarded a MacArthur Fellowship in 2003 in recognition of his outstanding work in the arts, Joyce is a consultant to museums worldwide seeking to build collections of African ironwork. Able to distinguish the subtleties of a blacksmith's skill and decipher the sequential hammer blows that transform an iron bloom into an iron artifact, Joyce's discerning eye and experience with African blacksmiths will enable the Fowler to tell a deeper and more complex story about iron. The project will benefit from his curatorial acumen as well as from his maker's perspective, and visitors will share in his knowledge via his voice in the exhibition. His unique expertise is further enriched by the first-rate scholarship and field research of co-curators Roberts, Drewal, and Dewey, and the project's team of advising scholars.

Work Accomplished to Date

- **2007:** Curators Joyce and Roberts initiate discussions about organizing a major traveling exhibition on African iron to expand upon previous exhibitions curated independently by each. Joyce continues to survey collections of iron works in the U.S., Europe and Africa;

- **2008:** Joyce conducts his first field research in Ghana and Togo among Ewe, Ga, and Fante blacksmiths and collaborates with ethnomusicologist and musician Steven Feld on a soundscape project, recording working rhythms in Ewe blacksmith shops in Yohonou, Togo, for use in *Striking Iron.* See http://vimeo.com/50357677.

- **2009:** Drewal and Joyce meet in Santa Fe to discuss the possibility of working together on the project. Joyce continues to do research on African iron artworks in museums across the country and during visits to private collections. In December Joyce and Drewal begin field research in Ghana, Togo, and Bénin among Ewe, Kabre, and Fon blacksmiths;

- **2010:** While still in Africa, Drewal and Joyce draft the first exhibition outline and prepare a formal invitation to Roberts and Dewey to commence working together to organize the exhibition. Fowler Director Marla Berns is notified of the co-curator's plans, and Joyce, Roberts, Drewal, and Dewey initiate an interim project to assemble three panels of scholars/potential consultants to assess the state of research on African iron at the ACASA (Arts Council of the African Studies Association) Triennial, held at UCLA in 2011. Joyce and Dewey continue research on African iron artworks in museums and private collections;

- **2011:** The three-panel series, *Artistry of African and Diaspora Blacksmiths,* is convened by the curators at the 15th Triennial Symposium on African Art held at UCLA. Thirteen interdisciplinary panelists from six countries contribute original papers on iron-related research. The curatorial team makes a presentation to Fowler staff and a meeting with speakers and potential consultants to *Striking Iron* is held. Fowler agrees to serve as the organizing institution for project. A planning meeting of the four-member curatorial team and Fowler staff is held in Los Angeles in July. The curatorial team meets again in September in Santa Fe;

- **2012:** Joyce and Drewal take a winter trip to Mali and Burkina Faso to shoot footage of Bamana, Dogon, and Senufo smiths. Exhibition collections research continues. A May planning meeting at the Fowler with staff and curatorial team is held to discuss project components and humanities themes. Dewey attends annual meetings and conferences with iron-oriented Africanist archaeologists to enlist their interest in the project, including the African Studies Association meetings, the Society of Africanist Archaeologist meetings, and the Congress of the Pan African Archaeological Association meetings;

- **2013:** Joyce meets with Fowler staff in February and in September, Joyce, Roberts, Drewal, Dewey, and Fowler staff meet to continue discussions on the exhibition's thematic organization, object list, fundraising ideas, venues for the traveling exhibition, the publication, and K-12 curricular themes and public programs; and,

- **2014:** In March the 16th ACASA Triennial meets in Brooklyn and is preceded by a curatorial planning session to further develop the project. Fowler staff asks the curatorial team to participate in writing an NEH Planning grant. A list of consultants is drafted to invite their participation in the project. A preliminary exhibition prospectus is developed to share with potential exhibition venues. Conversations via phone, email and Skype continue throughout the year.

V. AUDIENCE, MARKETING, AND PROMOTION

The Fowler Museum is widely recognized for its ability to make complex topics engaging, accessible, and thought-provoking for a diversity of visitors. Los Angelenos still talk about exhibitions, such as the seminal NEH-funded *Sacred Arts of Haitian Vodou* (1995) and how it changed their thinking entirely about Haiti and Vodou religion. Based on past Fowler exhibition attendance, members and audiences familiar with or who self-identify with African arts and culture will be eager to visit *Striking Iron*. Through creative programming, marketing, and outreach we also seek to generate new audience curiosity and interest in the subject by drawing attention to iron's necessity and ubiquity, which for most of us lies beyond our daily consciousness. How many Americans are aware that iron generates the fields of magnetic polarity that keep our planet spinning on its axis while orbiting the sun? That the iron in our blood and its oxygen-producing properties are what keep us breathing and alive? We plan to use some of these basic big picture questions in our print and radio marketing to spur interest in the project.

Programming developed around *Striking Iron* will also draw attention to the pervasiveness of iron-related language and imagery in American popular culture while helping audiences make connections to the objects on view and their importance to African peoples. Most of us have heard of the Iron Age, yet iron—as a metaphor for strength and perseverance—lingers in our vernacular expressions: "ruling with an iron fist," and "strike when the iron is hot," or "too many irons in the fire." It is also found in numerous popular movie titles: the blockbuster *Iron Man* series, *The Iron Lady* (2011), the infamous *Pumping Iron* (1977), and John Ford's iconic silent film, *Iron Horse* (1924). Moreover, for the more than 100 million registered players of the massively popular computer game *Minecraft*, iron ingot is one of the most critical resources you can virtually "gather." Almost any 9-year-old player can tell you that iron is absolutely critical for successfully building fortresses, strongholds and dungeons, and for creating tools, rail tracks, and armor.

Finally, a burgeoning interest in craft and all things homemade will be another point of access for many visitors. DIYers have exploded across the United States in the past two decades to become a $29 billion-a-year industry. From hand-knitted scarves and ceramic dinnerware to canned organic jam and craft beer, it is estimated that more than half of U.S. households take part in at least one crafting activity. What has also shifted is American's perception of craft. Once considered simple and old-fashioned if not completely derided, activities that are skilled, made by hand, and passed down by generations, are now gaining much-earned respect in a way not seen since the Arts and Crafts movement of the 1930s. At the same time, there persists a widespread misunderstanding that a blacksmith is a person who simply "shoes" horses. This project is an opportunity to bring value and legitimacy to a time-honored American profession that has been all but invisible in the context of the machine-made equivalents of things once forged by hand. We look forward to reaching out to artists, crafters, and metalworkers of all kinds in Los Angeles and across the U.S, and to demonstrate the ongoing vitality of the blacksmith's art in Africa today.

Partnerships: Strategic outreach is an essential component in Los Angeles' competitive arts market. As with past exhibitions of this scale, the Museum will develop a comprehensive public relations plan to insure strong audience support in the Los Angeles metropolitan area and beyond. In addition to its partnership with Adam's Forge, the Museum is working to create tie-ins with the California Blacksmith Association and Homeboy Industries, as well as the more than two dozen community colleges and adult trade programs across the region that offer metal work and welding as part of their class curricula. We also intend to reach out to the world's largest international blacksmithing organization, the Artist-Blacksmith's Association of North America (ABANA), and its many chapter organizations in California and around the country, and to share our strategies and programming ideas with each of the exhibition's host venues.

Outreach to Local and National Media: The Fowler will launch the exhibition with a press preview featuring the curatorial team. The Museum will promote the project via press packets, press releases, and radio/newspaper advertising to approximately 150 media-outlets. Targeted vehicles will include major local newspapers *(e.g., Los Angeles Times, Los Angeles Sentinel, La Opinión, L.A. Weekly);* public radio (e.g., KCRW, KPCC); culturally specific local outlets such as the *African Times*, national outlets such as *Blacksmith's Journal, The Anvil's Ring*, and *Anvil Magazine*; and various African culture web sites.

Existing Communications Vehicles will promote the exhibition to audiences already receiving regular communications from the Museum (approximately 20,000). The Museum's Director of Communications and Engagement will coordinate inclusion of announcements, narrative coverage, and promotions for the project in newsletters, brochures, e-news, social media, and other vehicles. For select programs like the *Striking Iron Festival,* the Museum will advertise through print and broadcast media, utilizing community and media partners' and campus mailing lists. The *Striking Iron* webpage will also contain pertinent information about public programs in Los Angeles and at the other tour venues and will be linked to the Fowler Museum home page, which receives upwards of 500 visits a day.

VI. PROJECT EVALUATION

The Fowler will implement a program of front-end visitor research during the planning period in order to ensure that exhibition strategies embrace visitors' prior knowledge, successfully communicate key messages and themes, and expand visitors' connections to the ideas presented and works on view. To assess the public's engagement with the exhibition's concepts and components, the Fowler will work with an independent evaluator, Emi Yoshimura, to develop a set of front-end and formative evaluative tools (interviews, focus groups, mock-up and sample text trials) to be implemented during this period. Of particular interest will be understanding visitors' pre-knowledge of the basic science and history of iron in Africa; assessing their responses to the planned opening video program and the exhibition's emphasis on the notion of iron's "empowering roles" and spiritual potency; and determining how effectively visitor interest can be sustained throughout the walkthrough as proposed. This storyline testing will guide the eventual phrasing of texts, development of the opening audiovisual presentation, and other interpretive elements.

VII. ORGANIZATIONAL PROFILE

Mission, Size and Humanities Resources: The Fowler Museum at UCLA is Los Angeles' preeminent museum dedicated to exploring world arts and cultures, past and present. Exhibitions and programs cover a wide range of global artistic expressions, from Africa, Asia, the Pacific, Native and Latin America, and their respective diasporas. The Fowler's mission is to enhance the understanding and appreciation of the diverse peoples, cultures, and religions of the world by presenting exhibitions, publications, and public programming deeply informed by interdisciplinary approaches and by the voices and perspectives of the cultures, communities, artists, and practitioners represented. Also featured is the work of international contemporary artists presented within the complex frameworks of politics, history, and social action.

Since its founding in 1963, the Fowler Museum has grown to house more than 120,000 works of art and material culture, and stored off-site, over 5 million archaeological artifacts and objects spanning over 4,000 years. Collections are made available to audiences beyond Los Angeles through an ambitious program of traveling exhibitions, inter-institutional object loans, and expanding web-based resources. As one of the most active university museums circulating exhibitions nationally and internationally, recent Fowler shows have traveled to institutions including the National Museum of African Art, Smithsonian Institution, Washington D.C.; Herbert F. Johnson Museum of Art at Cornell, Ithaca, NY; Spencer Museum of Art, University of Kansas, Lawrence; Asia Society Texas Center, Houston; Miami Art Museum; Krannert Art Museum, University of Illinois, Urbana-Champaign; Musée de la civilisation, Quebec City, Canada; and musée du quai Branly, Paris.

Special Characteristics and Recent Activities: Since its inception, the Fowler has produced more than 250 exhibitions, more than 130 publications, and more than 20 curriculum units for students and teachers. Large-scale projects such as the Warhol Foundation-funded *In Extremis: Death and Life in 21st-Century Haitian Art* (2012-13) and the NEA-funded *Central Nigeria Unmasked: Arts of the Benue River Valley* (2011), which recently completed an international tour, demonstrate the Fowler's range of curatorial interests and approaches, encompassing the local to the global. Recent exhibitions such as *Transcultural Pilgrim: Three Decades of Work by José Bedia* (2011-12) and *Nick Cave: Meet Me at the Center of the Earth* (2010) have introduced Los Angeles museum-goers to artists not previously exhibited in Southern California museums as well as to timely subjects with international resonance. Past NEH-funded exhibitions include *Intersections:*

World Arts, Local Lives (2006), an ongoing permanent installation; *Mami Wata: Arts for Water Spirits in Africa and the African Atlantic World* (2008); *Art of Rice: Spirit and Sustenance In Asia* (2004); *A Saint in the City: Sufi Arts of Urban Senegal* (2003); *Ways of the Rivers: Arts and Environment of the Niger Delta* (2002); *The Heritage of African Music* (2000); *Wrapped In Pride: Ghanaian Kente and African American Identity* (1999), and *Sacred Arts of Haitian Vodou* (1995), among others. Please see www.fowler.ucla.edu for a full exhibition history.

Operating Budget and Annual Number of Visitors: More than 60,000 people visit the Fowler Museum each year, including over 7,500 K-12 students from LA-area schools. The Museum's annual operating budget is $5.1 million with 33 full-time staff equivalents.

VIII. PROJECT TEAM

Curatorial

Lead curator **Tom Joyce** brings to the project an encyclopedic knowledge of African iron works from collections around the world along with in-depth and firsthand knowledge of the history and impact of forging across the Continent. His field research includes African ironwork, sculpture and blacksmithing traditions, most recently in Mali, Burkina Faso, Ghana, Togo, and Bénin. Joyce is the recipient of a 2003 MacArthur Foundation Fellowship and was recently awarded an Honorary Doctorate from the Santa Fe University of Art and Design. His work can be found in more than 27 public collections around the world. Since 1981 his sculptures have been exhibited in 152 solo and group exhibitions including at the Smithsonian American Art Museum, Minneapolis Institute of Art, Detroit Institute of Art, Boston Museum of Fine Art, and Musée Des Arts Decoratifs, Paris, France, along with major commissions from museums and sculpture parks across the country. In his work, Joyce re-examines the social, political, economic and historical implications of using iron, infusing his pieces and commissions with inherited histories and material memories. He will serve as lead curator of *Striking Iron* and co-editor of the exhibition publication and author of its introductory chapter along with a chapter each on forging iron and the social life of iron.

Allen F. Roberts received his Ph.D. in Anthropology from the University of Chicago in 1980, and is now Professor of World Arts and Cultures at UCLA. He is a renowned scholar of the arts and humanities of Francophone sub-Saharan Africa, and his many books and exhibitions include *The Rising of a New Moon: A Century of Tabwa Art* (with Evan M. Maurer, 1985, NEH implementation funding); *Iron, Master of Them All* (with William Dewey, 1992); and *Animals in African Art: From the Familiar to the Marvelous* (with Carol Thompson, 1995, NEH implementation funding). Professor Roberts conducts research and writes with Dr. Mary (Polly) Nooter Roberts, and their traveling exhibitions and award-winning books include *MEMORY: Luba Art and the Making of History* (1996, NEH implementation) and *A Saint in the City: Sufi Arts of Urban Senegal* (2003, NEH implementation). Roberts brings extensive experience to *Striking Iron* as a curator of complex yet accessible NEH-sponsored exhibition programs. As co-editor of the publication, he will help introduce the volume and write chapters about the performance of ironworking technologies, iron and value in precolonial Africa, and case studies on Central African smelting and forging.

Henry J. Drewal is Evjue-Bascom Professor of Art History and Afro-American Studies and Adjunct Curator of African Art at the Chazen Museum of Art, both at the University of Wisconsin-Madison. With two Masters' degrees and a Ph.D. from Columbia University in African Art History/Anthropology, he is one of the preeminent scholars of Yoruba art and expressive culture. Since 1991, Drewal has contributed to several Fowler exhibitions and catalogues, was co-curator (with John Mason) of the Fowler exhibition *Beads, Body, and Soul: Art and Light in the Yoruba Universe* (1998), and served as lead curator of the NEH-funded *Mami Wata: Arts for Water Spirits in Africa and the African Atlantic World,* (2008). He has also conducted extensive field research in the Republic of Bénin, Ghana, Brazil, and now in India on African communities of the Indian Ocean world. For the *Striking Iron* project, he will contribute a chapter on iron and African cosmologies and a Case Study on the various Yoruba deities who are represented by iron objects to the exhibition publication.

William Dewey, Associate Professor of Art History at Pennsylvania State University and a recent Fulbright Fellow, received his Master's degree from Northwestern University and a Ph.D. from Indiana University, both in Art History. Post-doctoral fellowship research on indigenous iron and copper production and usage in

Zimbabwe and the DRC resulted in the chapter "Forging Memory," with S. Terry Childs in *MEMORY: Luba Art and the Making of History* (1996), edited by Mary Nooter Roberts and Allen F. Roberts. More general publications on African iron include the exhibition and catalogue, *Iron, Master of Them All* (1992), with Allen F. Roberts, and chapters in the exhibition catalogues *Fatal Beauty: Traditional Weapons of Central Africa* (2009), and *Material Differences: Art and Identity in Africa* (2003). Dewey has conducted extensive field research with blacksmiths in Swaziland, Mozambique, Madagascar, Tanzania, Zanzibar, Zambia, the DRC, and Zimbabwe. Dewey will oversee the editing of the publication's archaeology and smelting chapters, and contribute two chapters of his own on smelting among Shona blacksmiths of Zimbabwe and relationships between kings and blacksmiths of Central Africa.

Key Humanities Advisors/Consultants

Rowland Abiodun, John C. Newton Professor of the History of Art and Black Studies, Amherst College, is a renowned expert of the arts and philosophy of Yoruba peoples of Nigeria and the Republic of Bénin. His traveling exhibitions and accompanying publications have been of singular importance, such as *Yoruba: Nine Centuries of African Thought and Art* (1990) and *The Yoruba Artist* (1994), both co-curated with *Striking Iron* co-curator Henry Drewal. Professor Abiodun's much-anticipated monograph, *Yoruba Art and Language: Seeking the African in African Art* (2014, Cambridge) has just been published. Professor Abiodun's own family is culturally associated with *Ogun,* the Yoruba deity of iron and "cutting-edge" innovation, and he will include first-hand accounts of its principles and practices in an interleaf for the publication.

Shadreck Chirikure, Senior Lecturer, Department of Archaeology, University of Cape Town, South Africa, studies precolonial indigenous metals production and use in sub-Saharan Africa, and especially in Southern Africa. He combines archaeological, ethnographic, and historical approaches to investigate mining, metallurgy, and associated socio-cultural processes. Professor Chirikure's recent publications include "On Evidence, Facts, and Fantasy: On the Origins of Metallurgy in Africa" in the *Journal of African Archaeology* (2010), and his new book, *Metals in Society,* is forthcoming. In addition to this expertise, Professor Chirikure will bring his work on African heritage politics to the *Striking Iron* planning discussions.

Steven Feld, Emeritus Distinguished Professor of Anthropology, University of New Mexico, and MacArthur Fellow, is a celebrated ethnomusicologist, musician, and filmmaker. Feld's academic research principally concerns the anthropology of senses, sound, and voice, incorporating studies in linguistics and poetics, music and aesthetics, and acoustics and ecology. His earlier work in New Guinea was presented in his monograph *Sound and Sentiment* (3rd ed. 2012, Duke) and his more recent work in West Africa has led to works such as *Jazz Cosmopolitanism in Accra* (2012, Duke). Professor Feld and Joyce have worked together with blacksmiths in Central Togo, with Feld studying how the rhythms of forging are an active accompaniment necessary to the making of things. Feld's expertise will be essential to creating the proposed final section of the exhibition, *Sounding Forms*, and he will also contribute an essay to the publication on percussive rhythms originating from blacksmith's working environments.

Candice Goucher, Professor of History, Washington State University/Vancouver, is trained in history, archaeology, and art history, and has conducted research in West Africa and the Caribbean. Her films include the award-winning "Blooms of Banjeli: Technology and Gender in West-African Iron-Making" (1986), and her research in historical archaeology has elucidated production and trade of iron smelted and forged in Northern Togo and Ghana, and the specific capture of West African blacksmiths, enslaved to produce forged implements necessary to the transatlantic slave trade and sugar-plantation economies of the Caribbean. She is also an expert in World History, and her publications include *World History: Journeys from Past to Present* (2008, Routledge). She was one of two lead scholars for the 26-unit PBS/Annenberg series *Bridging World History* directed to high school audiences and available online, and will assist the *Striking Iron* team not only with her subject matter expertise but also with educational programming.

Colleen Kriger, Professor of History, University of Carolina/Greensboro, is the author of *Pride of Men: Ironworking in 19th-Century West Central Africa* (1999, James Currey), based upon her doctoral research in the Congo River Basin. Her work is among the very few detailed studies of earlier African smelting and smithing—and is the very best we have to date. While Professor Kriger's more recent research has concerned

histories of African textile production and economies, she is eager to return to her passion for the historical study of iron production in Central Africa.

Scott MacEachern, Professor of Anthropology, Bowdoin College, is an expert on ethno-archaeology of the Mandara Mountains of Northern Cameroon and Northeastern Nigeria. Among his many publications is *Metals in Mandara Mountains' Society and Culture* (2012, Red Sea Press). The many years of archaeological, ethnographic, and historical research that he and his colleagues have conducted in Northern Cameroon arguably stand as the most deeply detailed of any iron-producing peoples of Africa. Iron smelting and smithing have long been of central importance to local societies, informing cosmologies and ritual as well as practical purposes, such as when young women are given talismanic "marriage skirts" of forged iron pendants. Professor MacEachern will bring his depth and breadth of knowledge to bear on *Striking Iron* themes and will be asked to write a Case Study on the Mandara Mountain region.

Patrick McNaughton, War Years Chancellor's Professor and Chair of the Department of Art History, Indiana University/Bloomington, is the author of *The Mande Blacksmiths: Knowledge, Power, and Art in Western Africa* (1988, Indiana), acknowledged as *the* classic study of African smithing in cultural context. His presentation on a panel convened by *Striking Iron* curators at the 15th Triennial Symposium on African Art, "Potent Presence: Blacksmiths in Mande Lore," updated our understanding of ironworking in Southern Mali, as do his recent papers on "The Smiths of Sunjata," "Reconsidering the History of West African Metallurgy," and "Blacksmiths' Spiritual Beliefs and Practices." His contributions to *Striking Iron* will also include his studies of African iron weaponry, and especially throwing knives of North-Central Africa as well as his work on Mande blacksmiths, to be incorporated into a Case Study on Bamana smiths.

Other Project Consultants

Lyn Avins, retired LAUSD teacher and longtime Fowler collaborator, will serve as our education consultant. Avins taught for more than 35 years in the Los Angeles Unified School District and has since worked as an education advisor with a variety of Los Angeles-area museums (e.g., LACMA, Natural History Museum, California African American Museum). For more than two decades, Avins has been an active participant in major Fowler exhibition-related meetings, served on its teacher advisory committees, and has co-authored more than 20 exhibition-based curriculum resource units. For *Striking Iron*, Avins will attend the planning meetings, develop a program for the proposed curricular resources, and draft selected lessons to be tested during the planning phase.

Peter Kirby, president of Media Art Services since 1985, has produced and directed over 100 works for major museums, galleries and visual artists both nationally and internationally. Kirby's team of professionals offer a range of services including the production of media components (film, video, audio and still photography) for exhibitions, the design and creation of interactive kiosks and museum web sites; collaboration with museum exhibition designers to integrate media into exhibitions; and design of the media delivery systems for exhibitions. For *Striking Iron*, Kirby will oversee the concept development and production of the introductory video, a critical presentational strategy to introduce the presence and potency of iron to audiences.

Emi Yoshimura is an independent evaluator and current Education Programs Manager at Descanso Gardens in La Cañada Flintridge, CA. Prior to this position, she was the Director, Evaluation at the Natural History Museum of Los Angeles County for over four years. Her responsibilities included integrating visitor studies into the work of exhibition development and program teams, and identifying division-wide needs for information on the visitor experience, developing evaluation protocols, and communicating study findings. In this role, she guided exhibition development teams through evaluation studies that were key in the creation of two, AAM "Excellence in Exhibition" award winning exhibitions (2014 Recipient: "Nature Lab," 2012 Recipient, "Dinosaur Hall"). She will oversee the evaluative process for *Striking Iron.*

Key Fowler Staff

Marla C. Berns is Shirley and Ralph Shapiro Director of the Fowler Museum at UCLA and an adjunct assistant professor in the Department of Art History, UCLA. An Africanist, her publishing and curatorial work has concentrated on the arts of Northeastern Nigeria, encompassing ceramic sculpture, decorated gourds,

programs of body scarification, ironworking and issues of gender and identity. As Fowler Director, Berns is charged with setting priorities and providing direction and vision for the Museum's core programming. In 2002, the second year of her tenure at the Fowler, she launched the initiative to create the Museum's first long-term exhibition of its permanent collections, *Intersections: World Arts, Local Lives* (2006-present, NEH-funded). Most recently she served as the lead curator of the major international traveling exhibition *Central Nigeria Unmasked: Arts of the Benue River Valley* and was co-editor and author of the accompanying publication. With nearly 40 years of curatorial experience, Berns will serve as overall project director for *Striking Iron,* oversee the exhibition's development and all of its primary components, and contribute a Case Study and a publication interleaf on the role of iron in Northeastern Nigeria.

Betsy D. Quick, director of education and curatorial affairs, oversees the curatorial process and the development of interpretative components, teacher services and school programs, and curricular materials for both K-12 and university levels. Quick is a past president of Museum Educators of Southern California and received her M.A. from UC Berkeley in Art History. She has authored a number of publications and articles on the teaching of world arts and humanities, including award-winning educational materials produced in conjunction with the Museum's major exhibitions (all NEH-funded). Recent curatorial projects include *Mandela for President: South Africa Votes for Democracy* (2013) and *Yards of Style: African-Print Cloths of Ghana* (2014). Quick brings nearly 40 years of experience working in museum education and will ensure *Striking Iron* is accessible to audiences of all ages and backgrounds.

Sebastian M. Clough, director of exhibitions, studied art and art history at UCLA. From 1995 to 2002 he was the principal at Metric Design, producing large-scale public art installations by contemporary artists in the U.S., Japan, and Europe. From 2002- 2008 he was the Exhibition Designer at the Museum of Contemporary Art, Los Angeles, producing exhibitions such as **©***Murakami, Robert Rauschenberg: Combines,* and *WACK! Art and the Feminist Revolution.* Clough joined the Fowler Museum in 2008 and since then has designed and produced over 40 unique and visually compelling small and large-scale exhibitions for the museum. He will oversee the design, construction, and installation of *Striking Iron*.

Gassia Armenian, curatorial and research associate, will serve as liaison to the exhibition's many lenders, ensuring all objects comply with the standards and laws of provenance, and will secure photographic images and copyright permissions and coordinate on-site photography of objects for the publication.

Bridget DuLong, project manager, exhibitions, will coordinate the project's in-house development and production schedule, liaise with the curatorial team, and later, manage the exhibition's national and international tour.

The entire **Fowler staff** will also contribute by providing considerable internal support.

IX. WORK PLAN

Begin Contract Period October 2015

October - December

- Begin negotiations with potential lenders about loan conditions and evaluate duration and costs of institutional and private loans (Armenian, Azzurra Di Marcello, Registrar, Rachel Raynor, Director of Registration and Collections Management, Berns); work on object research and selection continues (Curatorial team)

January - February

- Fowler project staff works with evaluator to identify and draft research questions and parameters of study (Quick, Yoshimura)
- Draft object list complete (Armenian, Raynor, DiMarcello, Berns, Curatorial team)
- Negotiations with host venues ongoing (DuLong, Berns)
- Fundraising and development ongoing. Meetings with potential funders begin (Berns, Michael Ruff, Director of Development and team)

- Preparations for upcoming 5-day planning meeting with curators and consultants; drafts of exhibition outline and object list sent to team in advance for review (ALL)

March - April

- Planning meeting with curatorial team, consulting scholars, and Fowler staff with aim of refining exhibition's thematic organization, object list, publication outline, and outreach programs (ALL)
- Further negotiations with lenders and collections research continues based on results of planning meeting (Joyce, Armenian)
- Refine and finalize evaluation tools based on planning meeting input (Yoshimura, Quick)
- Finalize table of contents for publication, contact authors (Curatorial team, Lynne Kostman, Managing Editor)

May

- Development of an Introductory Video mockup for focus group testing (Fowler's Media Manager Gene McHugh, filmmaker Kirby, Joyce, and other key Fowler staff: Berns, Quick and Clough)
- Draft sample label copy in preparation for focus group and interview assessment and testing (Quick)
- Evaluation tools and schedule finalized, participants identified and confirmed (Quick, Yoshimura)
- Preliminary outreach to partner organizations in L.A. to discuss the upcoming exhibition (Quick)

June

- Development of preliminary interpretive strategies and texts (ongoing)
- Implement visitor evaluation program and disseminate and discuss findings with team (Quick); refine exhibition components based on evaluative outcomes (Berns, Quick, Curatorial team)
- Begin drafting exhibition walkthrough based on results of planning meeting, visitor evaluation, collections research, and installation design concepts (Curatorial team, Berns, Quick, Clough)
- Participating authors provide synopses of their publication essays (Curatorial team, Kostman)
- Meetings with local blacksmithing community regarding outreach and program development (Quick)
- Develop curricular and programmatic tie-ins and opportunities with campus humanities and community college/vocational faculty (Quick); K-12 curricular resource planning begins (Quick, Avins)
- Development of Web-based offerings continues (Quick, McHugh, Curatorial team)

July

- Walkthrough development ongoing (Curatorial team and Fowler staff)
- Discussion of scholarly symposium and other educational programming continues (Berns, Quick)
- Begin development of long-lead marketing campaign (Rowanne Henry, director of communications and engagement)
- Finalize commitments/contracts with publication authors and begin seeking image permissions (David Blair, Deputy Director, Kostman, Armenian)
- Begin preliminary publication design concept (Danny Brauer, Director of Publications)
- Begin negotiating loans with lending institutions and finalize checklist (Di Marcello, Raynor)
- Finalize exhibition design and layout (Clough); finalize project budget costs (Blair)

X. FUNDRAISING PLAN

The Fowler has a proven track record of successful fundraising for major exhibitions and a development plan is underway to identify potential external funding sources for *Striking Iron*. It will include appeals to foundations, corporations, and individuals with a record of support for the Museum and for the arts of Africa, such as the Ralph M. Parsons Foundation, the Ethnic Arts Council of Los Angeles, American Express, and a cadre of generous, longtime patrons of the Museum. Several restricted Fowler endowments are also earmarked for support of Africa-based projects and programs.

To meet our NEH cost share match for this planning period, the Museum will provide support in the form of staff salaries for key project team members. The majority of this funding comes from the annual permanent allocation the Museum receives from UCLA. Other funds will come from internal unrestricted accounts, including the Jay T. Last Fowler Museum Fund and the Shirley & Ralph Shapiro Director's Discretionary Fund.